|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Teacher: Archer Elem.** | | | **Grade: 3rd** | | | **Date(s)**: Day 8 |
| **Unit Title:**  Planning a Family Reunion | | | | **Corresponding Unit Task: Prior to Task 2 and 3** | | |
| **Essential Question(s): How does understanding place value help me add and subtract numbers?** | | | | | | |
| **Materials/Resources** | | | | **Essential Vocabulary** | | |
| **Teacher:**  Overhead  Place value blocks | | **Student:**  **Paper and pencil**  **Place value chart**  **Place value blocks** | | | **Add addend addition compose/decompose**  **Difference place value (ones, tens, hundreds)**  **Strategies subtract sum subtraction** | |
| **Learning Experience** | | | | | | |
| **8 Mathematical Practices:**  x 1. Make sense of problems and persevere in solving them.  x 2. Reason abstractly and quantitatively.  x 3. Construct viable arguments and critique the reasoning of others.  x 4. Model with mathematics.  x 5. Use appropriate tools strategically.  x 6. Attend to precision.  x 7. Look for and make use of structure.  8. Look for and express regularity in repeated reasoning.  x | **Common Core State Standards: 3 NBT 2 Fluently add subtract within 1,000 using strategies and algorithms based on place value, properties of operations, and/or the relationship between addition and subtraction.** | | | | | |
| **I Can Statement(s):I can count, read, and write whole numbers to 1,000.**  **I can identify place value for each digit.**  **I can add and subtract whole numbers from 0 to 1,000 with or without regrouping.**  **I can show my answer 2 ways.** | | | | | |
| **Activating Strategy/Hook:** (How will students become cognitively engaged and focused?)  The teacher will begin by asking students to respond to the following questions in their math journals:  • There is a tree with five branches. On each branch there are three nests. In each nest there are four eggs. How many eggs are there in all?  Once students are finished, the class will discuss the strategies they used to add. There should also be discussion about using subtraction to verify results. | | | | | |
| **Teacher Directed:** The teacher will demonstrate by modeling for students how to take a word problem and make decisions about how to solve. Roberto is saving for a pair of tennis shoes that costs $55. He has $15 now. If he saves $3 a week, for how many weeks will Roberto need to save in order to buy the shoes? Model for students how to add $15 + 3 until you get to $55 or higher. Use a chart to show this or just write in a linear fashion. Also use the place value blocks to show the groups of 3 ones. Go back and add how many 3’s you added to explain the number of weeks it took. Ask if anyone has another idea of how to solve this problem. Then work the problem by starting with $55 and subtracting the $15. Then use a table to add 3 repeatedly until you get to the difference. You’ll have to discuss needing one additional week to get the extra $1. | | | | | |
| **Guided Practice:** Teacher will help students brainstorm how to begin working on the first problem on the “Figuring Out Addition and Subtraction” recording sheet from [www.georgiastandards.org/](http://www.georgiastandards.org/) page 48. Students should be encouraged to solve their problems in multiple ways: models, pictures, numbers, and words.  The following problem is the question on the above recording sheet.  • Your school cafeteria sells popsicles for twenty five cents, nutty buddies for forty cents, and ice cream cones for thirty cents. If a student spends five dollars in the month of October for these treats, what could the student have bought? List as many combinations as you can find. | | | | | |
| **Independent Practice:** Give students another problem to solve in their math journal: If the dollar store has bouncy balls for 10 cents, marbles for 2 cents and you have 50 cents to spend, what combination of balls and marbles could you buy? You must buy some of both. Show at least 3 different combinations. | | | | | |
| **Closing/Summarizing Strategy:** Students share with another group one of the combinations they came up with and explain how they know it is correct. | | | | | |
| **Differentiation Strategies** | | | | | | |
| **Extension** | | | **Intervention** | | | **Language Development** |
| Students show different combinations they could make if the marbles cost 5 cents. | | | Use 10 rods and ones cubes. | | | Show students how to count by 10’s and buy as many balls as possible, then count by 2’s to finish counting to 50. Circle the 2’s to see how many marbles you bought. Etc. |
| **Assessment(s):**  Informal – Teacher Observation | | | | | | |
| **Teacher Reflection:** (Next steps?) | | | | | | |